

#73



ENTERED 1600
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RAW SEQUENCE LISTING

DATE: 02/28/2002

PATENT APPLICATION: US/09/828,995B

TIME: 13:15:50

Input Set : A:\PTO.VSK.txt

Output Set: N:\CRF3\02282002\I828995B.raw

3 <110> APPLICANT: Heska Corporation
 4 McCall, Catherine A.
 5 Tang, Liang A.
 7 <120> TITLE OF INVENTION: COMPOSITIONS AND METHODS RELATED TO CANINE IgG AND CANINE
 IL-13 RECEPTORS
 9 <130> FILE REFERENCE: AL-7
 11 <140> CURRENT APPLICATION NUMBER: 09/828,995B
 12 <141> CURRENT FILING DATE: 2001-04-09
 14 <150> PRIOR APPLICATION NUMBER: 60/195,874
 15 <151> PRIOR FILING DATE: 2000-04-07
 17 <150> PRIOR APPLICATION NUMBER: 60/195,659
 18 <151> PRIOR FILING DATE: 2000-04-07
 20 <160> NUMBER OF SEQ ID NOS: 104
 22 <170> SOFTWARE: PatentIn version 3.1
 24 <210> SEQ ID NO: 1
 25 <211> LENGTH: 51
 26 <212> TYPE: DNA
 27 <213> ORGANISM: Canis familiaris
 29 <220> FEATURE:
 30 <221> NAME/KEY: CDS
 31 <222> LOCATION: (1)..(51)
 32 <223> OTHER INFORMATION:
 35 <400> SEQUENCE: 1
 36 ttc aat gaa tgc aga tgc act gat aca ccc cca tgc cca gtc cct gaa 48
 37 Phe Asn Glu Cys Arg Cys Thr Asp Thr Pro Pro Cys Pro Val Pro Glu
 38 1 5 10 15
 40 cct 51
 41 Pro
 45 <210> SEQ ID NO: 2
 46 <211> LENGTH: 17
 47 <212> TYPE: PRT
 48 <213> ORGANISM: Canis familiaris
 50 <400> SEQUENCE: 2
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 53 1 5 10 15
 56 Pro
 60 <210> SEQ ID NO: 3
 61 <211> LENGTH: 51
 62 <212> TYPE: DNA
 63 <213> ORGANISM: Canis familiaris
 65 <400> SEQUENCE: 3
 66 aggttcaggg actgggcatg ggggtgtatc agtgcacatg cattcattga a 51
 69 <210> SEQ ID NO: 4
 70 <211> LENGTH: 1654

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72 <213> ORGANISM: Canis familiaris
74 <220> FEATURE:
75 <221> NAME/KEY: CDS
76 <222> LOCATION: (70)..(1473)
77 <223> OTHER INFORMATION:
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81 ggcacgagcc agccccagg atccccagg gacccattc agtgctcagg acacaacaca      60
83 gacaccacc atg gag tct gtg ttc tgc tgg gtt ttc ctt gtc gtt att tta      111
84      Met Glu Ser Val Phe Cys Trp Val Phe Leu Val Val Ile Leu
85      1          5          10
87 aaa ggt gtc cag ggt gag gtg cag ttg gtg gag tct ggg gga gac ctg      159
88 Lys Gly Val Gln Gly Glu Val Gln Leu Val Glu Ser Gly Gly Asp Leu
89 15          20          25          30
91 gtg aag cct ggg ggg tcc ctg aga ctc tcc tgt gtg gcc tct gga ttc      207
92 Val Lys Pro Gly Gly Ser Leu Arg Leu Ser Cys Val Ala Ser Gly Phe
93          35          40          45
95 acc ttc agt tcg tac tac atg cat tgg atc cgc cag gct cca ggg aag      255
96 Thr Phe Ser Ser Tyr Tyr Met His Trp Ile Arg Gln Ala Pro Gly Lys
97          50          55          60
99 ggg ctt cag cgg gtc gca cat att aga ggt gat gga agg act aca cac      303
100 Gly Leu Gln Arg Val Ala His Ile Arg Gly Asp Gly Arg Thr Thr His
101          65          70          75
103 tac gca gac gct atg aag ggc cga ttc acc atc tcc aga gac aac gcc      351
104 Tyr Ala Asp Ala Met Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ala
105          80          85          90
107 aag aac acg ctg tat ctg cag atg aat agc ctg aca gtc gaa gac acg      399
108 Lys Asn Thr Leu Tyr Leu Gln Met Asn Ser Leu Thr Val Glu Asp Thr
109 95          100          105          110
111 gct att tat tac tgt gta aag gac ata tac tat ggg gtc ggg gac tat      447
112 Ala Ile Tyr Tyr Cys Val Lys Asp Ile Tyr Tyr Gly Val Gly Asp Tyr
113          115          120          125
115 tgg ggc cag gga acc ctg gtc acc gtc tcc tca gcc tcc acc acg gcc      495
116 Trp Gly Gln Gly Thr Leu Val Thr Val Ser Ser Ala Ser Thr Thr Ala
117          130          135          140
119 ccc tcg gtt ttc cca ctg gcc ccc agc tgc ggg tcc act tcc ggc tcc      543
120 Pro Ser Val Phe Pro Leu Ala Pro Ser Cys Gly Ser Thr Ser Gly Ser
121          145          150          155
123 acg gtg gcc ctg gcc tgc ctg gtg tca ggc tac ttc ccc gag cct gta      591
124 Thr Val Ala Leu Ala Cys Leu Val Ser Gly Tyr Phe Pro Glu Pro Val
125          160          165          170
127 act gtg tcc tgg aat tcc ggc tcc ttg acc agc ggt gtg cac acc ttc      639
128 Thr Val Ser Trp Asn Ser Gly Ser Leu Thr Ser Gly Val His Thr Phe
129 175          180          185          190
131 ccg tcc gtc ctg cag tcc tca ggg ctt cac tcc ctc agc agc atg gtg      687
132 Pro Ser Val Leu Gln Ser Ser Gly Leu His Ser Leu Ser Ser Met Val
133          195          200          205
135 aca gtg ccc tcc agc agg tgg ccc agc gag acc ttc acc tgc aac gtg      735
136 Thr Val Pro Ser Ser Arg Trp Pro Ser Glu Thr Phe Thr Cys Asn Val

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137	210	215	220	
139 gtc cac cca gcc agc aac act aaa gta gac aag cca gtg ttc aat gaa				783
140 Val His Pro Ala Ser Asn Thr Lys Val Asp Lys Pro Val Phe Asn Glu				
141	225	230	235	
143 tgc aga tgc act gat aca ccc cca tgc cca gtc cct gaa cct ctg gga				831
144 Cys Arg Cys Thr Asp Thr Pro Pro Cys Pro Val Pro Glu Pro Leu Gly				
145	240	245	250	
147 ggg cct tcg gtc ctc atc ttt ccc ccg aaa ccc aag gac atc ctc agg				879
148 Gly Pro Ser Val Leu Ile Phe Pro Pro Lys Pro Lys Asp Ile Leu Arg				
149 255	260	265	270	
151 att acc cga aca ccc gag gtc acc tgt gtg gtg tta gat ctg ggc cgt				927
152 Ile Thr Arg Thr Pro Glu Val Thr Cys Val Val Leu Asp Leu Gly Arg				
153	275	280	285	
155 gag gac cct gag gtg cag atc agc tgg ttc gtg gat ggt aag gag gtg				975
156 Glu Asp Pro Glu Val Gln Ile Ser Trp Phe Val Asp Gly Lys Glu Val				
157	290	295	300	
159 cac aca gcc aag acc cag tct cgt gag cag cag ttc aac ggc acc tac				1023
160 His Thr Ala Lys Thr Gln Ser Arg Glu Gln Gln Phe Asn Gly Thr Tyr				
161	305	310	315	
163 cgt gtg gtc agc gtc ctc ccc att gag cac cag gac tgg ctc aca ggg				1071
164 Arg Val Val Ser Val Leu Pro Ile Glu His Gln Asp Trp Leu Thr Gly				
165	320	325	330	
167 aag gag ttc aag tgc aga gtc aac cac ata gac ctc ccg tct ccc atc				1119
168 Lys Glu Phe Lys Cys Arg Val Asn His Ile Asp Leu Pro Ser Pro Ile				
169 335	340	345	350	
171 gag agg acc atc tct aag gcc aga ggg agg gcc cat aag ccc agt gtg				1167
172 Glu Arg Thr Ile Ser Lys Ala Arg Gly Arg Ala His Lys Pro Ser Val				
173	355	360	365	
175 tat gtc ctg ccg cca tcc cca aag gag ttg tca tcc agt gac aca gtc				1215
176 Tyr Val Leu Pro Pro Ser Pro Lys Glu Leu Ser Ser Ser Asp Thr Val				
177	370	375	380	
179 agc atc acc tgc ctg ata aaa gac ttc tac cca cct gac att gat gtg				1263
180 Ser Ile Thr Cys Leu Ile Lys Asp Phe Tyr Pro Pro Asp Ile Asp Val				
181	385	390	395	
183 gag tgg cag agc aat gga cag cag gag ccc gag agg aag cac cgc atg				1311
184 Glu Trp Gln Ser Asn Gly Gln Gln Glu Pro Glu Arg Lys His Arg Met				
185	400	405	410	
187 acc ccg ccc cag ctg gac gag gac ggg tcc tac ttc ctg tac agc aag				1359
188 Thr Pro Pro Gln Leu Asp Glu Asp Gly Ser Tyr Phe Leu Tyr Ser Lys				
189 415	420	425	430	
191 ctc tct gtg gac aag agc cgc tgg cag cag gga gac ccc ttc aca tgt				1407
192 Leu Ser Val Asp Lys Ser Arg Trp Gln Gln Gly Asp Pro Phe Thr Cys				
193	435	440	445	
195 gcg gtg atg cat gaa act cta cag aac cac tac aca gat cta tcc ctc				1455
196 Ala Val Met His Glu Thr Leu Gln Asn His Tyr Thr Asp Leu Ser Leu				
197	450	455	460	
199 tcc cat tct ccg ggt aaa tgagcaacac gcccggcacc cagcaagccc				1503
200 Ser His Ser Pro Gly Lys				
201	465			

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203 cccacccttg gctctcagga tcccctgagg acacctgagc ccctgtccct gtgtacataa 1563
205 ccctgggtag gcacccatca tgaaataaag caccagcac tgccctgggc cctgcaaaaa 1623
207 aaaaaaaaaa aaaaaaaaaa aaaaaaaaaa a 1654
210 <210> SEQ ID NO: 5
211 <211> LENGTH: 468
212 <212> TYPE: PRT
213 <213> ORGANISM: Canis familiaris
215 <400> SEQUENCE: 5
217 Met Glu Ser Val Phe Cys Trp Val Phe Leu Val Val Ile Leu Lys Gly
218 1 5 10 15
221 Val Gln Gly Glu Val Gln Leu Val Glu Ser Gly Gly Asp Leu Val Lys
222 20 25 30
225 Pro Gly Gly Ser Leu Arg Leu Ser Cys Val Ala Ser Gly Phe Thr Phe
226 35 40 45
229 Ser Ser Tyr Tyr Met His Trp Ile Arg Gln Ala Pro Gly Lys Gly Leu
230 50 55 60
233 Gln Arg Val Ala His Ile Arg Gly Asp Gly Arg Thr Thr His Tyr Ala
234 65 70 75 80
237 Asp Ala Met Lys Gly Arg Phe Thr Ile Ser Arg Asp Asn Ala Lys Asn
238 85 90 95
241 Thr Leu Tyr Leu Gln Met Asn Ser Leu Thr Val Glu Asp Thr Ala Ile
242 100 105 110
245 Tyr Tyr Cys Val Lys Asp Ile Tyr Tyr Gly Val Gly Asp Tyr Trp Gly
246 115 120 125
249 Gln Gly Thr Leu Val Thr Val Ser Ser Ala Ser Thr Thr Ala Pro Ser
250 130 135 140
253 Val Phe Pro Leu Ala Pro Ser Cys Gly Ser Thr Ser Gly Ser Thr Val
254 145 150 155 160
257 Ala Leu Ala Cys Leu Val Ser Gly Tyr Phe Pro Glu Pro Val Thr Val
258 165 170 175
261 Ser Trp Asn Ser Gly Ser Leu Thr Ser Gly Val His Thr Phe Pro Ser
262 180 185 190
265 Val Leu Gln Ser Ser Gly Leu His Ser Leu Ser Ser Met Val Thr Val
266 195 200 205
269 Pro Ser Ser Arg Trp Pro Ser Glu Thr Phe Thr Cys Asn Val Val His
270 210 215 220
273 Pro Ala Ser Asn Thr Lys Val Asp Lys Pro Val Phe Asn Glu Cys Arg
274 225 230 235 240
277 Cys Thr Asp Thr Pro Pro Cys Pro Val Pro Glu Pro Leu Gly Gly Pro
278 245 250 255
281 Ser Val Leu Ile Phe Pro Pro Lys Pro Lys Asp Ile Leu Arg Ile Thr
282 260 265 270
285 Arg Thr Pro Glu Val Thr Cys Val Leu Asp Leu Gly Arg Glu Asp
286 275 280 285
289 Pro Glu Val Gln Ile Ser Trp Phe Val Asp Gly Lys Glu Val His Thr
290 290 295 300
293 Ala Lys Thr Gln Ser Arg Glu Gln Gln Phe Asn Gly Thr Tyr Arg Val
294 305 310 315 320
297 Val Ser Val Leu Pro Ile Glu His Gln Asp Trp Leu Thr Gly Lys Glu

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Output Set: N:\CRF3\02282002\I828995B.raw

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298          325          330          335
301 Phe Lys Cys Arg Val Asn His Ile Asp Leu Pro Ser Pro Ile Glu Arg
302          340          345          350
305 Thr Ile Ser Lys Ala Arg Gly Arg Ala His Lys Pro Ser Val Tyr Val
306          355          360          365
309 Leu Pro Pro Ser Pro Lys Glu Leu Ser Ser Ser Asp Thr Val Ser Ile
310          370          375          380
313 Thr Cys Leu Ile Lys Asp Phe Tyr Pro Pro Asp Ile Asp Val Glu Trp
314 385          390          395          400
317 Gln Ser Asn Gly Gln Gln Glu Pro Glu Arg Lys His Arg Met Thr Pro
318          405          410          415
321 Pro Gln Leu Asp Glu Asp Gly Ser Tyr Phe Leu Tyr Ser Lys Leu Ser
322          420          425          430
325 Val Asp Lys Ser Arg Trp Gln Gln Gly Asp Pro Phe Thr Cys Ala Val
326          435          440          445
329 Met His Glu Thr Leu Gln Asn His Tyr Thr Asp Leu Ser Leu Ser His
330          450          455          460
333 Ser Pro Gly Lys
334 465
337 <210> SEQ ID NO: 6
338 <211> LENGTH: 1654
339 <212> TYPE: DNA
340 <213> ORGANISM: Canis familiaris
342 <400> SEQUENCE: 6
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345 gctttatttc atgatgggtg cctaccaggg gttatgtaca cagggacagg ggctcagggtg 120
347 tcctcagggg atcctgagag ccaagggtgg ggggcttgct ggggtgccgg cggtgttgctc 180
349 atttaccogg agaatgggag agggatagat ctgtgtagtg gttctgtaga gtttcatgca 240
351 tcaccgcaca tgtgaagggg tctccctgct gccagcggct cttgtccaca gagagcttgc 300
353 tgtacaggaa gtaggaccgg tcctcgtcca gctggggcgg ggtcatgcgg tgcttccctc 360
355 cgggctcctg ctgtccattg ctctgccact ccacatcaat gtcagggtgg tagaagtctt 420
357 ttatcaggca ggtgatgctg actgtgtcac tggatgacaa ctcccttggg gatggcggca 480
359 ggacatacac actgggctta tgggcccctc ctctggcctt agagatggtc ctctcgatgg 540
361 gagacgggag gtctatgtgg ttgactctgc acttgaactc ctccctgtg agccagtcct 600
363 ggtgctcaat ggggaggacg ctgaccacac ggtagggtgcc gttgaactgc tgctcacgag 660
365 actgggtctt ggctgtgtgc acctocttac catccacgaa ccagctgatc tgcacctcag 720
367 ggtcctcacg gccagatctt aacaccacac aggtgacctc ggggtgttcgg gtaatcctga 780
369 ggatgtcctt ggggttccgg ggaaagatga ggaccgaagg ccctccaga ggttcaggga 840
371 ctgggcatgg ggggtgtatca gtgcatctgc attcattgaa cactggcttg tctactttag 900
373 tgttgctggc tgggtggacc acgttgagg tgaaggctct gctgggccac ctgctggagg 960
375 gcactgtcac catgctgctg agggagtga gacctgagga ctgcaggacg gacgggaagg 1020
377 tgtgcacacc gctggtcaag gagccggaat tccaggacac agttacaggc tcggggaagt 1080
379 agcctgacac caggcaggcc agggccaccg tggagccgga agtggaccgg cagctggggg 1140
381 ccagtgggaa aaccgagggg gccgtggtgg aggtgagga gacggtgacc aggggtccct 1200
383 gggcccaata gtcccggacc ccatagtata tgtcctttac acagtaataa atagccgtgt 1260
385 cttcgactgt caggctattc atctgcagat acagcgtgtt cttggcgttg tctctggaga 1320
387 tggatgaatc gcccttcata gcgtctgcgt agtgtgtagt ccttccatca cctctaata 1380
389 gtgcgacccg ctgaagcccc ttccctggag cctggcggat ccaatgcatg tagtacgaac 1440
391 tgaagggtgaa tccagaggcc acacaggaga gtctcaggga cccccaggc ttcaccaggt 1500

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Use of n and / or Xaa has been detected in the Sequence Listing. Review the Sequence Listing to ensure a corresponding explanation is present in the <220> to <223> fields of each sequence using n or Xaa.

VERIFICATION SUMMARY

PATENT APPLICATION: US/09/828,995B

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Input Set : A:\PTO.VSK.txt

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L:829 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:16
L:1139 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:18
L:1588 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:25
L:1589 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:25
L:1597 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:25
L:1686 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:26
L:1690 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:26
L:1736 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:27
L:1827 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:28
L:1829 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:28
L:1907 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:30
L:1909 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:30
L:2726 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:40
L:2839 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:48
L:3458 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:57
L:3544 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:59
L:3699 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:60
L:3823 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:62
L:5961 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:83
L:5997 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:84
L:6027 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:85
L:6057 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:86
L:6093 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:87
L:6117 M:341 W: (46) "n" or "Xaa" used, for SEQ ID#:88